



14.5 day fetal brain

16.5 day fetal brain

2 day neonatal brain

7 day neonatal brain

NB41 neuroblastoma

Neuro 2A neuroblastoma

muscle

yeast tRNA



FIG. 1

SUBSTITUTE SHEET (RULE 26)

BEST AVAILABLE COPY

FIG. 2

3/4

GDF-7 GGGGGAGRGHGRGRSRCSRKSLHVDF-KELGWDDWIIAPLDYEAHYCEGVDFPLRSHLEP----

GDF-1 RPRRDAEPVLGGGPGGACRARRLYVSF-REVGHRWVIAPRGFLANYCQGCALPVALSGSGGPP

BMP-2 REKRQAKHKQRKRLKSSCKRHPLYVDF-SDVGWNDWIVAPPGYHAFYCHGECPEPLADHLNS----

BMP-4 KRSPKHHSQARAKKNKNCRRHSLYVDF-SDVGWNDWIVAPPGYQAFYCHGDCPEPLADHLNS----

Vgr-1 SRGSGSSDYNGSELKTACKKHLYVSF-QDLGWQDWIIAPKGYAANYCDGECSCFPLNAHMNA----

OP-1 LRMANVAENSSSDQRQACKKHLYVSF-RDLGWQDWIIAPEGYAAYCEGECFPLNSYMNAAAA

BMP-5 SRMSSVGDYNTSEKQACKKHLYVSF-RDLGWQDWIIAPEGYAAFYCDGECSCFPLNAHMNA----

BMP-3 EQTLKKARRKQWIEPRNCARRYLKVDF-ADIGWSEWII SPKSFDAAYCSCGACQCFPMPSLKPS----

MIS GPGRQRSAGATAADGPCALRELSVDL-----RAERSVLIPETYQANNQGVCGWPQSDRNPRY----

Inhibin α ALRLLQRPPEEPAAHANCHRVALNISF-QELGWERWIVYPPSFIFHYCHGGGLHIPPNLSLPV-

Inhibin β HRRRRRGLECDGKY-NIICKKQFFVSF-KDIGWNDWIIAPSGYHANYCEGECPSHIAGTSGSSL-

Inhibin β HRI RKRGLGCDGRT-NLCRCQQFFIDF-RLIGWNDWIIAP TGYGYNYCEGSCPAYLAGVPGSAS-

TGF- β 1 HRRALDTNYCFSSSTEKNCCVRQLYIDFRKDLGWK-WIHEPKGYHANFCLGRCPIWSLD-----

TGF- β 2 KKRALDAAYCFRNVDNCCLRPLYIDFRDLGWK-WIHEPKGYANFACAGAPYLWSSD-----

TGF- β 3 KKRALDTNYCFRNLEENCCVRPLYIDFRQDLGWK-WVHEPKGYANFOSGPPPYLRSAD-----

GDF-7 -TNHAI IQTLNS--MAPDAAPASCCV--PARLSPISILYI-DAANNVVKQYEDMVVEACGGCR

GDF-1 ALNHAVLRALMHA--AAPGAADLPCCV--PARLSPISVLFF-DNSDNVVL RQYEDMVVDECGCR

BMP-2 -TNHAI VQTLVNS---VNSKIPKACCV--PTELS AISMLYL -DENEKWLKKNYQDMVVEGCGCR

BMP-4 -TNHAI VQTLVNS---VNSSIPKACCV--PTELS AISMLYL -DEYDKVLKKNYQDMVVEGCGCR

Vgr-1 -TNHAI VQTLVHL--MNPEYVPKPCCA--PTKLN AISVLYF-DDNSNVLKKNYRNMVVRACGCH

OP-1 -TNHAI VQTLVHF--INPEYVPKPCCA--PTQLN AISVLYF-DDSSNVLKKNYRNMVVRACGCH

BMP-5 -TNHAI VQTLVHL--MFPDHVPKPCCA--PTKLN AISVLYF-DDSSNVLKKNYRNMVVRACGCH

BMP-3 --NHATIQSIVRA-VGVVPGIPEPCV--PEKMSSLSILFF-DENKNVVLKVPNMTVESACR

MIS -GNHVLLKMQA--RGAALARPCCV--PTAYAGKLLISSEER--ISAHVPMVATECGCR

Inhibin α -PGAPPTPAQPYs-----LLPGAQPCCAALPGTMRPLHVRTTSDGGYSFKYETV PNL LQHACAI

Inhibin β -SFHSTVINHYRMGRGSHFANLSCCV--PTKL RPSMLY- DDGQNIKKDIQNMIVEECGCS

Inhibin β -SFHTAVNVQYRMGRGLNPGT-VNSCCI--PTKLSTMSMLYF-DDEYNIVKRDVPNMIVEECGCA

TGF- β 1 -TQYSKVLALYNG--HNPASASAPCCV--PQALEPLPIVY-VGRPKPV-EQLSNMIVRSCKCS

TGF- β 2 -TQHSRVLSLYNT--INPEASASPCV--SQDLEPLTILY-IGKTPKI-EQLSNMIVRSCKCS

TGF- β 3 -TTHSTVLGLYNT--LNPEASASPCV--PQDLEPLTILY-VGRTPKV-EQLSNMIVRSCKCS

FIG. 3

4/4

TGF- β 3	33	33	30	32	37	38	38	37	25	36	35	39	38	36	32	25	24	36	37	78	100	74	100	82	100
TGF- β 2	32	28	31	34	36	35	37	25	34	33	35	37	38	35	32	23	22	37	34	74	100	100	100	100	100
TGF- β 1	33	26	36	33	35	36	34	23	35	34	35	34	34	32	28	23	23	41	35	100	100	100	100	100	100
Inhibin β B	35	25	41	37	39	36	42	31	42	42	41	42	42	37	25	25	63	100	100	-	-	-	-	-	-
Inhibin β A	37	32	42	40	43	41	38	30	42	41	44	43	43	36	24	26	100	100	100	-	-	-	-	-	-
Inhibin α	23	20	25	24	27	26	26	27	22	22	25	24	24	29	18	100	-	-	-	-	-	-	-	-	-
MIS	34	20	22	27	26	25	31	21	27	27	24	27	24	30	100	-	-	-	-	-	-	-	-	-	-
BMP-3	42	34	42	47	46	46	38	29	48	47	44	42	43	100	-	-	-	-	-	-	-	-	-	-	-
BMP-5	46	55	50	52	54	52	42	31	61	59	91	88	100	-	-	-	-	-	-	-	-	-	-	-	-
OP-1	47	52	50	51	53	53	42	30	60	58	87	100	100	-	-	-	-	-	-	-	-	-	-	-	-
Vgr-1	46	55	53	51	53	52	45	31	61	60	100	100	100	-	-	-	-	-	-	-	-	-	-	-	-
BMP-4	43	51	50	57	56	57	38	34	92	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
BMP-2	42	52	53	57	57	57	41	33	100	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-9	27	32	33	33	34	33	27	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-8	35	31	41	37	38	37	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-7	48	48	46	80	80	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-6	44	51	49	86	100	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-5	46	47	49	100	100	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-3	50	42	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-2	33	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
GDF-1	100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

FIG. 4

SUBSTITUTE SHEET (RULE 26)